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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/989,703	11/21/2001	Markus J.H. Bulters	P 283256 D1098-CIP	9614

909 7590 10/26/2004  
PILLSBURY WINTHROP, LLP  
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EXAMINER
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MCLENDON, SANZA L

ART UNIT	PAPER NUMBER
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1711

DATE MAILED: 10/26/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

09/989,703

Applicant(s)

BULTERS ET AL.

Examiner

Sanza L McClendon

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 12 August 2004.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-21 and 26-32 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 7 and 8 is/are allowed.
- 6) ☒ Claim(s) 1-6, 9-16, 19, 21, 28, 29, 31 and 32 is/are rejected.
- 7) ☒ Claim(s) 17, 18, 20, 26, 27 and 30 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☒ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 8/04.
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### *Continued Examination Under 37 CFR 1.114*

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on August 12, 2004 has been entered.

### *Information Disclosure Statement*

2. The information disclosure statement filed August 12, 2004 fails to comply with 37 CFR 1.98(a)(3) because it does not include a concise explanation of the relevance, as it is presently understood by the individual designated in 37 CFR 1.56(c) most knowledgeable about the content of the information, of each patent listed that is not in the English language. It has been placed in the application file, but the information referred to therein has not been considered. It is unclear what evidence or explanation the proposal of R-1102 is to provide with reference to the claims and the prior art rejections.

### *Response to Amendment*

3. In response to the Request for Continued Examination under 37 CFR 1.114 received on August 12, 2004, the examiner has carefully considered the amendments. The examiner acknowledges the addition of claims 31-32.

### *Response to Arguments*

4. Applicant's arguments filed August 12, 2004 have been fully considered but they are not persuasive. Applicant appears to be relying on the limitation "consisting of " in the composition for the coated optical fiber to distinguish the instant invention over the prior

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art. However the prior art made of record teaching an optical fiber primary coating composition comprising from 28-85% by weight of a urethane diacrylate oligomer having a molecular weight of 1,000 to 6,000 g/mol, from 0-70% by weight of a mono-functional acrylate monomer having an aromatic moiety, from 0-50% by weight of a mono-functional acrylate monomer, from 0.1 to 10% by weight of a photoinitiator and from 0 to 5-wt% of an adhesion promoter, wherein the optional components (the mono-functional acrylate monomers and adhesion promoter) can be excluded and thus anticipating the composition of claim 1. Therefore, claims 1-6, 9-16, 19, 21, and 28-29 are still deemed to be rejected as found in the last Office Action—see below rejection. Wherein Aloisio Jr., et al teaches the equilibrium modulus ranges from 120 to 500 psi, wherein the lower limit from 120 to about 175 anticipate the claimed equilibrium modulus. The examiner is aware in formulation C, Aloisio Jr., et al teaches adding a chain transfer agent to lower the equilibrium modulus. However, the examiner deems that this is not the only method taught by Aloisio Jr., et al to tailor the equilibrium modulus.

*Claim Rejections - 35 USC § 102/35 USC § 103*

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

7. Claims 1-6, 9-16, 19, 21, 28-29, and 31-32 are rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Aloisio, Jr. et al (US 6,215,934 B1).

Aloisio et al teaches coated optical fibers with improved strippability. Said coated optical fibers comprise a primary layer and a secondary layer, wherein Aloisio et al teaches types of optical fibers can be group together in an array by a matrix bonding material. Said primary layer has an equilibrium (in-situ) modulus that is in the range from 120 to 500 psi (0.8 to 3.4 MPa)—see abstract. Aloisio et al teaches that primary coating compositions/coats having an equilibrium modulus in the upper range of about 500 psi is where the microbending losses in the fiber itself becomes unacceptable (column 6, lines 1-5). Said primary coating compositions typically from 28-85% by weight of a urethane diacrylate oligomer having a molecular weight of 1,000 to 6,000 g/mol, from 0-70% by weight of a mono-functional acrylate monomer having an aromatic moiety, from 0-50% by weight of a mono-functional acrylate monomer, from 0.1 to 10% by weight of a photoinitiator and from 0 to 5-wt% of an adhesion promoter, wherein the optional components (the mono-functional acrylate monomers and adhesion promoter) can be excluded and thus anticipating the composition of claim 1—see column 6, lines 10-15. In addition, Aloisio Jr., et al teaches optional additives, such as antioxidants, adhesion promoters, and additives to improve strippability can be added—see column 3, lines 58-60. This appears to anticipate the optional additives found in claims 2, 9, 11, 15, and 31. Aloisio et al teaches that the crosslink density of said primary coating corresponds to the plateau or “equilibrium” modulus on the storage modulus curve, which can be altered by increasing the crosslink density, wherein increasing the bimodal functionality, and others as found in column 6,

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lines 25-31. In addition, Aloisio Jr., et al teaches 6 ways to decrease the equilibrium modulus. While the examiner is aware that both steps 5 in the methods for increasing/decreasing the equilibrium modulus teaches adding or reducing the amount of chain transfer agents, a person of ordinary skill in the art would have found it obvious to increase/decrease the equilibrium modulus using the other steps as taught by Aloisio Jr., et al. the motivation would have been a reasonable expectation of increasing/decreasing the equilibrium modulus to obtain a primary coating material that is not too stiff to adequately cushion the glass fiber in the absence of evidence to the contrary.

Aloisio et al does not expressly teach the cavitation strength for said formulation, however Aloisio et al teaches the equilibrium modulus, refers to the crosslink density as a function of moduli, such as the plateau or "equilibrium modulus" on the storage modulus curve, therefore it can be assumed that the primary coating has a storage modulus at 23 0C in order to obtain the crosslink density. Therefore, the primary coating composition of Aloisio et al should inherently have cavitation strength property as defined in the instant application, as well as, having a curve on the Mooney plot, a strain energy release rate, and a calculated volumetric thermal expansion as seen in the instant claims. And because the Patent and Trademark Office is not equipped to conduct experimentation in order to determine whether Applicant's composition differs and, if so, to what extent, from the discussed reference. Therefore, with the showing of the reference, the burden of establishing non-obviousness by objective evidence is shifted to the Applicants.

*Allowable Subject Matter*

8. Claims 7-8 are allowed.
9. The following is an examiner's statement of reasons for allowance: the primary reasons for allowance in the method for curing a primary coating composition is the first curing steps, which has a total energy between 5 and 50 mJ/cm<sup>2</sup>
10. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

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11. Claims 17-18, 20, 26-27 and 30 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.


12. The following is a statement of reasons for the indication of allowable subject matter: the prior art fails to teach a primary coating on an optical fiber of a composition of the instantly claimed application, such as found in claims 26-27 and 30, which additionally comprises a secondary coating having the properties as defined in claims 17-18.

### *Conclusion*

13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sanza L McClendon whose telephone number is (571) 272-1074. The examiner can normally be reached on Monday through Friday 7:30-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James Seidleck can be reached on (571) 272-1078. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Sanza L McClendon

Examiner

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